

# I

**IAF-**

(See INITIAL APPROACH FIX.)

**IAP-**

(See INSTRUMENT APPROACH PROCEDURE.)

**IAWP-** Initial Approach Waypoint

**ICAO-**

(See ICAO Term INTERNATIONAL CIVIL AVIATION ORGANIZATION.)

**ICING-** The accumulation of airframe ice.

Types of icing are:

a. **Rime Ice-** Rough, milky, opaque ice formed by the instantaneous freezing of small supercooled water droplets.

b. **Clear Ice-** A glossy, clear, or translucent ice formed by the relatively slow freezing of large supercooled water droplets.

c. **Mixed-** A mixture of clear ice and rime ice.

Intensity of icing:

a. **Trace-** Ice becomes perceptible. Rate of accumulation is slightly greater than the rate of sublimation. Deicing/anti-icing equipment is not utilized unless encountered for an extended period of time (over 1 hour).

b. **Light-** The rate of accumulation may create a problem if flight is prolonged in this environment (over 1 hour). Occasional use of deicing/anti-icing equipment removes/prevents accumulation. It does not present a problem if the deicing/anti-icing equipment is used.

c. **Moderate-** The rate of accumulation is such that even short encounters become potentially hazardous and use of deicing/anti-icing equipment or flight diversion is necessary.

d. **Severe-** The rate of accumulation is such that deicing/anti-icing equipment fails to reduce or control the hazard. Immediate flight diversion is necessary.

**IDENT-** A request for a pilot to activate the aircraft transponder identification feature. This will help the controller to confirm an aircraft identity or to identify an aircraft.

(Refer to AIM.)

**IDENT FEATURE-** The special feature in the Air Traffic Control Radar Beacon System (ATCRBS)

equipment. It is used to immediately distinguish one displayed beacon target from other beacon targets.

(See IDENT.)

**IF-**

(See INTERMEDIATE FIX.)

**IFIM-**

(See INTERNATIONAL FLIGHT INFORMATION MANUAL.)

**IF NO TRANSMISSION RECEIVED FOR (TIME)-**

Used by ATC in radar approaches to prefix procedures which should be followed by the pilot in event of lost communications.

(See LOST COMMUNICATIONS.)

**IFR-**

(See INSTRUMENT FLIGHT RULES.)

**IFR AIRCRAFT-** An aircraft conducting flight in accordance with instrument flight rules.

**IFR CONDITIONS-** Weather conditions below the minimum for flight under visual flight rules.

(See INSTRUMENT METEOROLOGICAL CONDITIONS.)

**IFR DEPARTURE PROCEDURE-**

(See IFR TAKEOFF MINIMUMS AND DEPARTURE PROCEDURES.)

(Refer to AIM.)

**IFR FLIGHT-**

(See IFR AIRCRAFT.)

**IFR LANDING MINIMUMS-**

(See LANDING MINIMUMS.)

**IFR MILITARY TRAINING ROUTES (IR)-** Routes used by the Department of Defense and associated Reserve and Air Guard units for the purpose of conducting low-altitude navigation and tactical training in both IFR and VFR weather conditions below 10,000 feet MSL at airspeeds in excess of 250 knots IAS.

**IFR TAKEOFF MINIMUMS AND DEPARTURE PROCEDURES-** Federal Aviation Regulations, Part 91, prescribes standard takeoff rules for certain civil users. At some airports, obstructions or other factors require the establishment of nonstandard takeoff minimums, departure procedures, or both to assist pilots in avoiding obstacles during climb to the minimum en route altitude. Those airports are listed in NOS/DOD Instrument Approach Charts (IAP's) under a section entitled "IFR Takeoff Minimums and Departure Proce-

dures." The NOS/DOD IAP chart legend illustrates the symbol used to alert the pilot to nonstandard takeoff minimums and departure procedures. When departing IFR from such airports or from any airports where there are no departure procedures, DP's, or ATC facilities available, pilots should advise ATC of any departure limitations. Controllers may query a pilot to determine acceptable departure directions, turns, or headings after takeoff. Pilots should be familiar with the departure procedures and must assure that their aircraft can meet or exceed any specified climb gradients.

**IF/IAWP-** Intermediate Fix/Initial Approach Waypoint. The waypoint where the final approach course of a T approach meets the crossbar of the T. When designated (in conjunction with a TAA) this waypoint will be used as an IAWP when approaching the airport from certain directions, and as an IFWP when beginning the approach from another IAWP.

**IFWP-** Intermediate Fix Waypoint

**ILS-**

(See INSTRUMENT LANDING SYSTEM.)

**ILS CATEGORIES-** 1. ILS Category I. An ILS approach procedure which provides for approach to a height above touchdown of not less than 200 feet and with runway visual range of not less than 1,800 feet.- 2. ILS Category II. An ILS approach procedure which provides for approach to a height above touchdown of not less than 100 feet and with runway visual range of not less than 1,200 feet.- 3. ILS Category III:

a. IIIA.-An ILS approach procedure which provides for approach without a decision height minimum and with runway visual range of not less than 700 feet.

b. IIIB.-An ILS approach procedure which provides for approach without a decision height minimum and with runway visual range of not less than 150 feet.

c. IIIC.-An ILS approach procedure which provides for approach without a decision height minimum and without runway visual range minimum.

**ILS PRM APPROACH-** An instrument landing system (ILS) approach conducted to parallel runways whose extended centerlines are separated by less than 4,300 feet and the parallel runways have a Precision Runway Monitoring (PRM) system that permits simultaneous independent ILS approaches.

**IM-**

(See INNER MARKER.)

**IMC-**

(See INSTRUMENT METEOROLOGICAL CONDITIONS.)

**IMMEDIATELY-** Used by ATC or pilots when such action compliance is required to avoid an imminent situation.

**INCERFA Uncertainty Phase) [ICAO]-** A situation wherein uncertainty exists as to the safety of an aircraft and its occupants.

**INCREASE SPEED TO (SPEED)-**

(See SPEED ADJUSTMENT.)

**INERTIAL NAVIGATION SYSTEM-** An RNAV system which is a form of self-contained navigation.

(See Area Navigation/RNAV.)

**INFLIGHT REFUELING-**

(See AERIAL REFUELING.)

**INFLIGHT WEATHER ADVISORY-**

(See WEATHER ADVISORY.)

**INFORMATION REQUEST-** A request originated by an FSS for information concerning an overdue VFR aircraft.

**INITIAL APPROACH FIX-** The fixes depicted on instrument approach procedure charts that identify the beginning of the initial approach segment(s).

(See FIX.)

(See SEGMENTS OF AN INSTRUMENT APPROACH PROCEDURE.)

**INITIAL APPROACH SEGMENT-**

(See SEGMENTS OF AN INSTRUMENT APPROACH PROCEDURE.)

**INITIAL APPROACH SEGMENT [ICAO]-** That segment of an instrument approach procedure between the initial approach fix and the intermediate approach fix or, where applicable, the final approach fix or point.

**INLAND NAVIGATION FACILITY-** A navigation aid on a North American Route at which the common route and/or the noncommon route begins or ends.

**INNER MARKER-** A marker beacon used with an ILS (CAT II) precision approach located between the middle marker and the end of the ILS runway, transmitting a radiation pattern keyed at six dots per second and indicating to the pilot, both aurally and visually, that he is at the designated decision height (DH), normally 100 feet above the touchdown zone elevation, on the ILS CAT II approach. It also marks progress during a CAT III approach.

(See INSTRUMENT LANDING SYSTEM.)

(Refer to AIM.)

**INNER MARKER BEACON-**

(See INNER MARKER.)

**INREQ-**

(See INFORMATION REQUEST.)

**INS-**

(See INERTIAL NAVIGATION SYSTEM.)

**INSTRUMENT APPROACH-**

(See INSTRUMENT APPROACH PROCEDURE.)

**INSTRUMENT APPROACH PROCEDURE-** A series of predetermined maneuvers for the orderly transfer of an aircraft under instrument flight conditions from the beginning of the initial approach to a landing or to a point from which a landing may be made visually. It is prescribed and approved for a specific airport by competent authority.

(See SEGMENTS OF AN INSTRUMENT APPROACH PROCEDURE.)

(Refer to FAR Part 91.)

(See AIM.)

a. U.S. civil standard instrument approach procedures are approved by the FAA as prescribed under Part 97 and are available for public use.

b. U.S. military standard instrument approach procedures are approved and published by the Department of Defense.

c. Special instrument approach procedures are approved by the FAA for individual operators but are not published in Part 97 for public use.

(See ICAO term INSTRUMENT APPROACH PROCEDURE.)

**INSTRUMENT APPROACH PROCEDURE**

**[ICAO]-** A series of predetermined maneuvers by reference to flight instruments with specified protection from obstacles from the initial approach fix, or where applicable, from the beginning of a defined arrival route to a point from which a landing can be completed and thereafter, if a landing is not completed, to a position at which holding or en route obstacle clearance criteria apply.

**INSTRUMENT APPROACH PROCEDURES CHARTS-**

(See AERONAUTICAL CHART.)

**INSTRUMENT DEPARTURE PROCEDURE (DP)-**

A preplanned instrument flight rule (IFR) air traffic control departure procedure printed for pilot use in graphic and/or textual form. DP's provide transition from the terminal to the appropriate en route structure.

(See IFR TAKEOFF MINIMUMS AND DEPARTURE PROCEDURES.)

(Refer to AIM.)

**INSTRUMENT DEPARTURE PROCEDURE (DP) CHARTS-**

(See AERONAUTICAL CHART.)

**INSTRUMENT FLIGHT RULES-** Rules governing the procedures for conducting instrument flight. Also a term used by pilots and controllers to indicate type of flight plan.

(See VISUAL FLIGHT RULES.)

(See INSTRUMENT METEOROLOGICAL CONDITIONS.)

(See VISUAL METEOROLOGICAL CONDITIONS.)

(Refer to AIM.)

(See ICAO term INSTRUMENT FLIGHT RULES.)

**INSTRUMENT FLIGHT RULES [ICAO]-** A set of rules governing the conduct of flight under instrument meteorological conditions.

**INSTRUMENT LANDING SYSTEM-** A precision instrument approach system which normally consists of the following electronic components and visual aids:

a. Localizer.

(See LOCALIZER.)

b. Glideslope.

(See GLIDESLOPE.)

c. Outer Marker.

(See OUTER MARKER.)

d. Middle Marker.

(See MIDDLE MARKER.)

e. Approach Lights.

(See AIRPORT LIGHTING.)

(Refer to FAR Part 91.)

(See AIM.)

**INSTRUMENT METEOROLOGICAL CONDITIONS-** Meteorological conditions expressed in terms of visibility, distance from cloud, and ceiling less than the minima specified for visual meteorological conditions.

(See VISUAL METEOROLOGICAL CONDITIONS.)

(See INSTRUMENT FLIGHT RULES.)

(See VISUAL FLIGHT RULES.)

**INSTRUMENT RUNWAY**- A runway equipped with electronic and visual navigation aids for which a precision or nonprecision approach procedure having straight-in landing minimums has been approved.

(See ICAO term **INSTRUMENT RUNWAY**.)

**INSTRUMENT RUNWAY [ICAO]**- One of the following types of runways intended for the operation of aircraft using instrument approach procedures:

a. **Nonprecision Approach Runway**-An instrument runway served by visual aids and a nonvisual aid providing at least directional guidance adequate for a straight-in approach.

b. **Precision Approach Runway, Category I**-An instrument runway served by ILS and visual aids intended for operations down to 60 m (200 feet) decision height and down to an RVR of the order of 800 m.

c. **Precision Approach Runway, Category II**-An instrument runway served by ILS and visual aids intended for operations down to 30 m (100 feet) decision height and down to an RVR of the order of 400 m.

d. **Precision Approach Runway, Category III**-An instrument runway served by ILS to and along the surface of the runway and:

1. Intended for operations down to an RVR of the order of 200 m (no decision height being applicable) using visual aids during the final phase of landing;

2. Intended for operations down to an RVR of the order of 50 m (no decision height being applicable) using visual aids for taxiing;

3. Intended for operations without reliance on visual reference for landing or taxiing.

Note 1: See Annex 10 Volume I, Part I, Chapter 3, for related ILS specifications.

Note 2: Visual aids need not necessarily be matched to the scale of nonvisual aids provided. The criterion for the selection of visual aids is the conditions in which operations are intended to be conducted.

**INTEGRITY**- The ability of a system to provide timely warnings to users when the system should not be used for navigation.

**INTERMEDIATE APPROACH SEGMENT**-

(See **SEGMENTS OF AN INSTRUMENT APPROACH PROCEDURE**.)

**INTERMEDIATE APPROACH SEGMENT [ICAO]**- That segment of an instrument approach procedure

between either the intermediate approach fix and the final approach fix or point, or between the end of a reversal, race track or dead reckoning track procedure and the final approach fix or point, as appropriate.

**INTERMEDIATE FIX**- The fix that identifies the beginning of the intermediate approach segment of an instrument approach procedure. The fix is not normally identified on the instrument approach chart as an intermediate fix (IF).

(See **SEGMENTS OF AN INSTRUMENT APPROACH PROCEDURE**.)

**INTERMEDIATE LANDING**- On the rare occasion that this option is requested, it should be approved. The departure center, however, must advise the ATCSCC so that the appropriate delay is carried over and assigned at the intermediate airport. An intermediate landing airport within the arrival center will not be accepted without coordination with and the approval of the ATCSCC.

**INTERNATIONAL AIRPORT**- Relating to international flight, it means:

a. An airport of entry which has been designated by the Secretary of Treasury or Commissioner of Customs as an international airport for customs service.

b. A landing rights airport at which specific permission to land must be obtained from customs authorities in advance of contemplated use.

c. Airports designated under the Convention on International Civil Aviation as an airport for use by international commercial air transport and/or international general aviation.

(Refer to **AIRPORT/FACILITY DIRECTORY**.)

(Refer to **IFIM**.)

(See ICAO term **INTERNATIONAL AIRPORT**.)

**INTERNATIONAL AIRPORT [ICAO]**- Any airport designated by the Contracting State in whose territory it is situated as an airport of entry and departure for international air traffic, where the formalities incident to customs, immigration, public health, animal and plant quarantine and similar procedures are carried out. **INTERNATIONAL CIVIL AVIATION ORGANIZATION [ICAO]**- A specialized agency of the United Nations whose objective is to develop the principles and techniques of international air navigation and to foster planning and development of international civil air transport.

a. Regions include:

1. African-Indian Ocean Region

2. Caribbean Region

3. European Region
4. Middle East/Asia Region
5. North American Region
6. North Atlantic Region
7. Pacific Region
8. South American Region

**INTERNATIONAL FLIGHT INFORMATION MANUAL-** A publication designed primarily as a pilot's preflight planning guide for flights into foreign airspace and for flights returning to the U.S. from foreign locations.

**INTERROGATOR-** The ground-based surveillance radar beacon transmitter-receiver, which normally scans in synchronism with a primary radar, transmitting discrete radio signals which repetitiously request all transponders on the mode being used to reply. The replies received are mixed with the primary radar returns and displayed on the same plan position

indicator (radar scope). Also, applied to the airborne element of the TACAN/DME system.

(See TRANSPONDER.)

(Refer to AIM.)

**INTERSECTING RUNWAYS-** Two or more runways which cross or meet within their lengths.

(See INTERSECTION.)

**INTERSECTION-**

a. A point defined by any combination of courses, radials, or bearings of two or more navigational aids.

b. Used to describe the point where two runways, a runway and a taxiway, or two taxiways cross or meet.

**INTERSECTION DEPARTURE-** A departure from any runway intersection except the end of the runway.

(See INTERSECTION.)

**INTERSECTION TAKEOFF-**

(See INTERSECTION DEPARTURE.)

**IR-**

(See IFR MILITARY TRAINING ROUTES.)

**I SAY AGAIN-** The message will be repeated.